

Best Management Practices

MISSOURI DEPARTMENT OF CONSERVATION



Northern Harrier

Circus cyaneus

Common name • Northern Harrier

Scientific name • *Circus cyaneus*

State status • Endangered

Ecology

In Missouri, northern harriers are a rare breeding species, arriving in March-April. They nest (often in loose colonies) fairly late in the season on dry ground in undisturbed marshes, prairies, and pastures, or on elevated ground in low shrubby vegetation, tall weeds, or reeds. Incubation lasts from 30-32 days, and young are fledged about 5 weeks later. Northern harriers are also a common migrant in Missouri from February to May and again from September to November frequenting open fields, prairies, native grass plantings, and shallow marshes. They perch on the ground or on stumps or posts, and forage for small mammals, birds, large insects (especially grasshoppers), snakes, lizards, toads, frogs, and carrion (in winter) over open terrain where there is good ground cover.

Reasons for Decline

The number of northern harriers declined as a result of wetland drainage, conversion of native prairies to agriculture, reforestation of grasslands, and the untimely mowing or haying of grassland nesting areas. During the mid-1900s, northern harrier populations suffered great losses due to pesticide-related egg shell thinning and losses of wetland nesting habitat. Harriers have disappeared from many former nesting areas, especially in southern parts of their range. Surveys suggest that they are still declining in parts of North America.

Specific Recommendations

Northern harriers benefit from restricting human use of breeding habitat, maintenance of habitat through prescribed burning and delayed mowing (not between March and July), elimination or restriction of grazing, retention of crop residue, planting and maintenance of native grassland, and restoration or development of wetlands. As a ground-nesting species, they require new growth to conceal their nest location, which may explain the late nesting season. Project activity in potential northern harrier habitat should avoid disturbance of nest sites and should protect potential breeding habitat.

- Prairies and native grass plantings should be maintained whenever possible.
- Open areas such as pastures, cropland, native grass plantings, and marshes where harriers nest should not be destroyed.
- Mowing earlier than August 1 should be avoided to lessen destruction of nests.
- Use of insecticides and rodenticides in nesting areas should be minimized: harriers can act as a natural, biological control of unwanted insects and rodents.

General Recommendations

Refer to Management Recommendations for Construction Projects Affecting Missouri Wetlands.

Information Contacts

For further information regarding construction projects in wetlands, contact:

Missouri Department of Conservation
Policy Coordination Section
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Missouri Department of Natural Resources
Division of Environmental Quality
P.O. Box 176
Jefferson City, MO 65102-0176
Telephone: 573/526-3315

U.S. Army Corps of Engineers
Regulatory Branch
700 Federal Building
Kansas City, MO 64106-2896
Telephone: 816/983-3990

U.S. Environmental Protection Agency
Water, Wetlands, and Pesticides Division
901 North 5th Street
Kansas City, KS 66101
Telephone: 913/551-7307

U.S. Fish and Wildlife Service
Ecological Services Field Office
608 E. Cherry Street, Room 200
Columbia, MO 65201
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Disclaimer

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